



**MEETING SUMMARY**

**HANFORD ADVISORY BOARD**

**Tank Waste Committee**

*February 10, 2021*

*Virtual Meeting via Teleconference and GoToMeeting*

<b>Topics in this Meeting Summary</b>
---------------------------------------

Opening.....	2
Commissioning .....	2
Draft Advice on Cleanup Priorities – TWC Topics.....	4
Tank Integrity Program.....	4
Committee Business and Open Forum .....	4
Attachments .....	5
Attendees .....	5

<p><i>This is only a summary of issues and actions discussed at this meeting. It may not represent the fullness of represented ideas or opinions, and it should not be used as a substitute for actual public involvement or public comment on any particular topic unless specifically identified as such.</i></p>
---

## **Opening**

Bob Suyama, Benton County and TWC, welcomed meeting participants.

Stan Branch, US Department of Energy (DOE), announced that this meeting was being held in accordance with the Federal Advisory Committee Act.

The TWC committee adopted the meeting summary for its January 2021 virtual meeting with minor edits from Dan McDonald of the Washington State Department of Ecology (Ecology).

The committee elected its chair and vice chair for 2021. There was only one nomination for chair, and Bob Suyama was elected to continue to serve as chair. There were two nominations for vice chair: Susan Leckband and Vince Panesko. The committee elected Susan Leckband to serve as TWC vice chair for 2021.

## **Commissioning**

Mat Irwin, DOE, provided the committee with a presentation on the Waste Treatment and Immobilization Plant (WTP) System Startup and Commissioning. He focused on the process of WTP startup, key elements of commissioning, and an update on the status of startup. The process is what leverages DOE to get to commissioning, including getting people trained and systems established and implemented.

There are a series of systems tests to ensure that WTP components will perform the way they should. Once the functional tests are complete, then commissioning starts. We are currently doing those functional tests, including what runs through the control room, the analytic lab, and ventilation. Because of the complexity of the systems at WTP, startup testing involves several systems that support each other. Testing also can involve coordination of multiple facilities with key WTP design features.

The commissioning process starts by testing individual capabilities and then becomes more complex by testing WTP systems as they work together. The contractor has hired the last of the commissioning techs and is now hiring lab techs. There will soon be a loss-of-power test. It is important that the commissioning techs can respond to alarms and restore power using the correct process. Additional pieces of WTP cold commissioning are:

- Low-Activity Waste (LAW) Facility and Effluent Management Facility (EMF) water runs
- Testing of Melter 1
- Glass product quality verification
- Testing of Melter 2
- Cold commissioning performance and capacity testing.

An independent DOE team will conduct the Operational Readiness Review. This examines staffing and a whole set of requirements to evaluate the adequacy of the plant. Following a successful review, WTP will be authorized to receive radioactive waste from the tank farms.

There are a number of considerations as the commissioning process progresses. Some of the WTP facilities and equipment were installed over a decade ago, so aging equipment needs to be inspected and maintained. Because of its size and complexity, there are also multiple operational and support facilities to pay attention to because they operate interdependently.

In 2000, WTP workers completed several important projects, including:

- Construction of the Low-Activity Waste Facility
- Construction of the Effluent Management Facility
- Startup testing of the Balance of Facilities
- Starting testing of the Analytical Laboratory (LAB)
- Commissioning of the LAB high-purity gas systems
- Operational readiness assessment of the LAB.

DOE anticipates commissioning one year from now.

### *Regulatory Perspectives*

Dan McDonald, Ecology, acknowledged that there is a lot of work going on, and Ecology is looking forward to WTP starting up. He explained that it is important for what is being built to match the appropriate permits and are in compliance with permit conditions.

### *Committee Discussion*

Steve Wiegman, Public-at-Large, noted that some radionuclides volatilize when they get hot. He asked what happens to them in the WTP system in terms of collection, recycling, and/or disposal. Mat Irwin explained that there are a number of off-gas components, and DOE has an ongoing discussion about how effective they are. DOE believes all the issues have been addressed.

Susan Leckband, League of Women Voters, asked if there have been any significant issues with a plant that has been under construction for more than a decade. Mat responded that there may be some integration components that require adjustments. DOE hopes to find and address challenges during the water run before the melters are tested.

Pam Larsen, City of Richland, asked if DOE is looking at lessons learned from experiences in England and from Idaho? Mat said that DOE is in contact with people from both locations.

Jeff Burright, Oregon Department of Energy, asked about connections to the Internet and if something goes wrong, are there things that are not software dependent as backups? Mat responded that the software is designed to fall into fail safe configurations if something goes wrong. This testing is part of commissioning. Mat could not go into details about the recent Solar Wind attack.

Vince Panesko, City of Richland, asked about melter foaming and the developing of cold caps. Specifically, he wanted to know how those potential issues would be addressed. Mat explained that there are alarms and control systems that indicate when something is going on with the melters.

Chris Sutton, Public-at-Large, asked if the project was on schedule to meet the dates for hot commissioning and startup. Mat said yes.

Rob Davis, City of Pasco, asked Dan McDonald if, from Ecology's perspective, this is the best technology? Dan responded that he would have to take that question back to Ecology's engineers.

Bob Suyama asked if there are any problems hiring workers because of COVID-19. Mat explained that there has not been a lack of candidates, and hiring is proceeding as planned.

TWC members asked for an update in the May/June timeframe. Some were particularly interested in the off-gas and best technology topics.

## **Draft Advice on Cleanup Priorities – TWC Topics**

Tom Galioto, Budgets and Contracts Committee (BCC) chair, reviewed the draft advice which is being sponsored by BCC. He explained that the objective was to gather input from all HAB committees so that the draft advice could be approved by BCC to go to the full HAB at its March meeting.

Dan McDonald, Ecology, pointed out the importance of understanding the Consent Decree schedule with respect to budget and funding control points because of their impact on the priority list.

The TWC reviewed the draft advice with particular attention to the section on Tank Waste cleanup items. Minor revisions were suggested regarding permitting and a question about the possibility of increased funding for the HAB considering the new seats being added.

TWC members were invited to send additional comments to Tom Galioto or the HAB facilitator.

## **Tank Integrity Program**

Bob Suyama, Issue Manager (IM) team lead, introduced the document he has compiled outlining tank integrity issues. Although it is in the format of draft advice, no decision has yet been made as to whether it will become draft advice or something else, like a white paper. To date, this document has only been distributed within the IM team.

Pam Larsen, City of Richland, asked that the document be distributed to all TWC members.

Steve Wiegman, Public-at-Large, observed that tank integrity is a complex issue that will remain an issue. It is not necessarily time critical, but it is an ongoing conversation that will last a long time.

Vince Panesko, City of Richland, commented on the inability to mix waste inside some of the tanks and the challenges of sampling to determine what is in each layer.

Susan Leckband, League of Women Voters, observed that the potential to develop advice or a white paper is there, although it is not time critical. She suggested the topic be included in the next Tank Waste meeting.

Bob Suyama offered to take the comments and input he has collected and incorporate them into the next version of the document. He will then send it out to the entire TWC.

## **Committee Business and Open Forum**

Bob Suyama requested a March TWC committee call. This may not be possible given that all committee calls in March have been cancelled due to the facilitation contract transition.

The committee requested several topics for its April meeting, including

- Grout issues
- DFLAW critical path update and discussion
- Off gas and mass balance presentation
- GAO report.

Gary Younger, DOE, explained that Erik Olds, DOE, who normally does the DFLAW critical path update may not be available before June. Gary suggested that there could be a Tank-Side Cesium Removal update. Bob Suyama said that updates would be acceptable but that he did not want those items to be major presentations at the next meeting.

Bob Suyama also asked that in the May/June timeframe, the committee receive information on lessons learned from WTP startup and commissioning, plus information on the System Plan and how it addresses potential tank failures and the need for new tanks.

### **Attachments**

Attachment 1: [Tank Waste Committee Meeting Agenda](#)

Attachment 2: [Waste Treatment & Immobilization Plant System Startup and Commissioning presentation](#)

Attachment 3: [Draft meeting summary for TWC January meeting](#)

Attachment 4: [TWC Work Plan](#)

### **Attendees**

#### **Board Members and Alternates:**

Jeff Burright, Primary	Shelley Cimon, Primary	Robert Davis, Primary
Pam Larsen, Primary	Susan Leckband, Primary	Liz Mattson, Primary
Marissa Merker, Alternate	Vince Panesko, Alternate	Dan Solitz, Primary
Chris Sutton, Alternate	Bob Suyama, Primary	Steve Wiegman, Primary
Steve Anderson, Primary		

#### **Others:**

Jim Alzheimer, DOE	Jeff Lyon, Ecology	Kelsey Shank, The Edge
JoLynn Garcia, DOE	Dan McDonald, Ecology	Dana Cowley, HMIS
Mat Irwin, DOE	Ryan Miller, Ecology	Ashley Herring, ProSidian
Gary Younger, DOE		Ruth Nicholson, HAB facilitator

Note: Participants for this virtual meeting were asked to sign in with their name and affiliation in the CHAT box of GoToMeeting. Not all attendees shared this information. The attendance list reflects what information was collected at the meeting.